

Title (en)

Coupling structure of heat transfer plate and gasket of plate type heat exchanger

Title (de)

Vorrichtung zur Verbindung einer Dichtung mit einer Wärmeaustauschplatte in einem Plattenwärmetauscher

Title (fr)

Dispositif de liaison d'un joint avec une plaque de transfert de chaleur pour échangeur de chaleur à plaques

Publication

**EP 1722184 A2 20061115 (EN)**

Application

**EP 05107784 A 20050824**

Priority

KR 20050038306 A 20050509

Abstract (en)

Coupling structure of a heat transfer plate (10) and a gasket (20) for use in a plate type heat exchanger, wherein a gasket groove (13), formed along the outer circumference of respective fluid passage holes and the heat transfer plate (10), and the gasket (20) to be inserted into the gasket groove (13) have a toothed engagement coupling structure (14,21,22). With this configuration, the coupling structure of the heat transfer plate and the gasket is remarkably simplified, while the contact area between the heat transfer plate and the gasket and the resulting coupling strength can be greatly improved. Thus, pressure resistance of the plate type heat exchanger can be greatly improved, allowing the plate type heat exchanger to be easily applied to high temperature and pressure heat exchanger facilities.

IPC 8 full level

**F28F 3/02** (2006.01); **F28F 3/10** (2006.01); **F28D 9/00** (2006.01)

CPC (source: EP KR US)

**F28D 9/00** (2013.01 - KR); **F28F 3/02** (2013.01 - KR); **F28F 3/10** (2013.01 - EP US)

Cited by

RU2617264C2; CN102393155A; EP3835702A1; EP3032208A1; CN105698585A; CN104034196A; EP4389934A1; CN106323076A; EP3825637A1; JP2022551334A; US11976889B2; US11639829B2; WO2016046119A1; WO2021115714A1; WO2021099048A1; US11320207B2; EP3489606A1; CN109813160A; CN114636331A; EP3001131A1; CN106716043A; EP3660436A1; CN111220006A; JP2021528625A; US9217608B2; US9903668B2; WO2024133654A1

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)

AL BA HR MK YU

DOCDB simple family (publication)

**EP 1722184 A2 20061115**; **EP 1722184 A3 20120801**; KR 100581843 B1 20060522; KR 20050050625 A 20050531; US 2006249282 A1 20061109; US 7490660 B2 20090217

DOCDB simple family (application)

**EP 05107784 A 20050824**; KR 20050038306 A 20050509; US 39647006 A 20060404